

## CLAIMS

What is claimed is:

1. A method of reconciling component variables with container variables in a document, comprising:

5           identifying variables in a component;  
            for each of these variables, determining if there is a variable in said  
container that refers to a same domain concept; and  
            if an identification occurs, associating said variable in the component with  
said variable in the container.

10           2. The method according to claim 1, further comprising:

            identifying a link expression of said variable; and  
            determining whether the link expression can be identified with an element  
in a domain model of the document.

15           3. The method according to claim 1, wherein said determining uses an automatic  
reconciliation algorithm to find a best identity match.

4. The method according to claim 3, wherein said best identity match comprises a direct match.

5. The method according to claim 3, wherein, with said best identity match found to said element in said domain model, the variable in the component is linked with the associated variable in the domain model.

6. The method according to claim 5, further comprising:

once the link is made, the variable in the component assuming a value of the variable in the containing document and the component variable is positioned in the document with the new value.

7. The method according to claim 3, wherein said identifying matches the variable of the component to the domain model elements to find the best match.

8. The method according to claim 1, wherein said identifying is performed interactively by a user.

9. The method according to claim 8, wherein said variable in the component is interactively displayed adjacent to a representation of an element of the domain model of the containing document.

10. The method according to claim 8, wherein a plurality of variables in the component are interactively displayed adjacent to a representation of elements of the domain model of the containing document.

11. The method according to claim 1, wherein said identifying comprises  
5 actuating, by a user, a variable in the component and interactively matching the variable to an element of the domain model.

12. The method according to claim 11, wherein said identifying is performed by said user for each variable in the component.

13. The method according to claim 12, wherein said user interactively determines  
10 whether the values to be assigned to the variables, once matched, should be the value in the containing document or the value in the imported component when said imported component has a value.

14. The method according to claim 3, wherein said automatic reconciliation  
15 automatically determines that the value to be assigned to the variable, once matched, is the value in the containing document.

15. The method according to claim 1, wherein said user, through a graphic user interface (GUI), identifies an association between said component variable and a domain model element.

16. The method according to claim 1, wherein said user interactively selects a container value.

17. A method of automatically reconciling component variables with container variables in a document, comprising:

identifying variables in a component;

for each of these variables, determining if there is a variable in said container that refers to a same domain concept; and

if an identification occurs, associating said variable in said component with the variable in said container.

18. A method of interactively reconciling component variables with container variables in a document, comprising:

displaying a component variable next to a representation of an element in a domain model of the document;

identifying an association between the component variable and said element in the domain model; and

matching said element of said domain model interactively by a user.

19. A system for reconciling component variables with container variables in a document relative to a domain model, comprising:

a container including a plurality of variables;

5 a component having a plurality of component variables in a document; and

a reconciler for mapping variables in said container, with variables in said component.

20. The system according to claim 17, wherein said reconciler is manually controlled by said user, to perform said mapping.

10 21. The system according to claim 19, further comprising:

a controller for automatically controlling said reconciler to perform said mapping.

22. The system according to claim 19, wherein if the variable in the component has a value, then no swapping is performed by said reconciler.

15 23. The system according to claim 19, wherein said component includes a plurality of alternative choices for being mapped by said reconciler.

24. The system according to claim 19, wherein when said variables in said document have a value and said reconciler is in an on-state, said reconciler reconciles said variables in said document with those in said container.

25. The system according to claim 19, wherein said components are built from a same domain model and wherein said variables in said container are reconciled with those in said components.

26. A system for importing document components, comprising:

an archive for storing a plurality of document components;

a container assembly for storing at least one of said plurality of document components; and

a connector for linking document components stored in said container assembly to document components stored in said archive,

wherein said document components are imported to said container assembly from said archive.

27. A system for importing document components, as claimed in claim 26, wherein said document components contain variables and said container assembly contains variables.

28. The system for importing document components, as claimed in claim 26,  
wherein said connector links a variable in a source document component to a  
variable in said container assembly.

29. The system for importing document components, as claimed in claim 28,  
wherein said variable in said source document resides in a document component  
template.

30. The system for importing document components, as claimed in claim 28,  
wherein said connector uses a reconciliation algorithm to link said components.

31. The system for importing document components, as claimed in claim 30,  
wherein said reconciliation algorithm links a variable in said source document  
component to a variable in said container assembly when said variable represents  
a same domain concept.

32. The system for importing document components, as claimed in claim 30,  
wherein the linkage between source document variables and assembly container  
variables can be altered by a user.

33. A system for reconciling component variables with container variables in a  
document, comprising:

means for identifying variables in a component;

means for determining, for each of said variables, if there is a variable in said container that refers to a same domain concept; and

means, if an identification occurs, for associating said variable in said component with said variable in the container.

34. A signal-bearing medium tangibly embodying a program of machine readable instructions executable by a digital processing apparatus to perform a method of reconciling component variables with container variables in a document, comprising:

identifying variables in a component;

for each of said variables, determining if there is a variable in the container that refers to a same domain concept; and

if an identification occurs, and associating the variable in the component with the variable in the container.

35. A signal-bearing medium tangibly embodying a program of machine readable instructions executable by a digital processing apparatus to perform a method of interactively reconciling component variables with container variables in a document, said method comprising:

displaying a component variable next to a representation of an element in a domain model of the document;



identifying an association between the component variable and said  
element in the domain model; and

matching said element of said domain model interactively by a user.

36. A signal-bearing medium tangibly embodying a program of machine readable  
instructions executable by a digital processing apparatus to perform a method of  
importing document components, said method comprising:

storing a plurality of document components in an archive;

inputting a selection parameter for a variable of said document  
components;

searching said archive for said variable using said selection parameter;

creating a connector for mapping said variable in said archive to a variable  
in a container assembly;

importing a document component from said archive with said mapped  
variable;

storing at least one of said plurality of document components received  
during said importing process in a container assembly; and

reconciling said imported mapped variable from said archive to said  
variable in said container assembly.

37. A method for importing document components comprising:

inputting selection parameters for variables of document components;

